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EXAMINER

PIAZZA CORCORAN, GLADYS JOSEFINA

ART UNIT

PAPER NUMBER

1733

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20

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/601,842

Applicant(s)

BIAGIOTTI, GUGLIELMO

Examiner

Gladys J Piazza Corcoran

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 23 October 2002.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 50-88 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 50-54, 56-58 and 62-88 is/are rejected.
- 7) ☒ Claim(s) 55, 56 (based on 55), 59-61, 72 (based on 55) is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                                     | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____  |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                            | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) <u>4, 7</u> . | 6) <input type="checkbox"/> Other: _____                                    |

**DETAILED ACTION**

***Claim Rejections - 35 USC § 112***

1. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

2. Claims 68 and 82 are rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. Claim 68 recites that one of the first or second layers is embossed according to the background pattern between a pair of rollers of a first embossing unit and then the second layer is embossed between a further embossing cylinder and a pressure roller for generating the background pattern on the second layer. There is no support in the specification for embossing the second layer with a background pattern between a first embossing unit and then later passing the second layer between a further embossing cylinder and a pressure roller for generating the background pattern. It is suggested to amend line 2 of claim 68 to read, --wherein said first layer is embossed--..

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claims 57, 64-69, 76, 78-87 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

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5. Claim 57 recites the limitation "said third set" in lines 3 and 6. There is insufficient antecedent basis for this limitation in the claim. It is suggested to either cancel this claim, define the third set in this claim, or depend this claim upon a claim that defines the third set. It is noted that claim 72 already recites the same limitations as claim 57 yet is dependent upon claim 56 which defines the third set.

6. Claim 64 recites the limitation "said background pattern" in line 2. There is insufficient antecedent basis for this limitation in the claim. It is suggested to depend claim 64 from claim 63 where the background pattern is defined.

7. It is unclear what Applicant intends to claim in claims 65, 78. That the background and ornamental protuberances of the first layer are formed from the same surface, or that the protuberances point in the same direction from the layer. It is unclear how the background protuberances of the second layer are related to the common face of a corresponding layer.

8. Claim 66 recites the limitation "said background pattern" in lines 3-4. There is insufficient antecedent basis for this limitation in the claim. It is unclear which background pattern (of the first layer or the second layer) is being referred to. It is suggested to amend to --said background pattern on the first layer and the second layer--.

9. Claim 67 recites the limitation "the second" in line 5. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --the second layer--.

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10. Claim 68 is unclear by reciting that one of the first or second layers is embossed according to the background pattern between a pair of rollers of a first embossing unit and then the second layer is embossed between a further embossing cylinder and a pressure roller for generating the background pattern on the second layer. It is unclear how the second layer can be embossed with the background pattern twice. It is suggested to amend line 2 of claim 68 to read, --wherein said first layer is embossed--.

11. Claim 68 recites the limitations "said first embossing cylinder" in line 11-12 and "said second embossing cylinder" in line 12. There is insufficient antecedent basis for these limitations in the claim. It is suggested to amend claim 67, line 6 to recite --a first embossing cylinder-- in order to provide antecedent basis for claim 68; then recite --said first embossing cylinder in claim 68, line 5, --said first embossing cylinder-- and in line 7 --a second embossing cylinder--.

12. Claim 79 recites the limitation "the second" in line 5. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --the second layer--.

13. Claim 83 recites the limitation "said background pattern" in lines 3-4. There is insufficient antecedent basis for this limitation in the claim. It is unclear which background pattern (of the first layer or the second layer) is being referred to. It is suggested to amend to --said background pattern on the first layer and the second layer--.

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14. Claim 84 recites the limitation "the second" in line 5. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to –the second layer--.

15. Claim 85 recites the limitation "the second" in line 5. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to –the second layer--.

***Claim Rejections - 35 USC § 102***

16. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

17. Claims 50-54, 56 (based on 54), 57 (based on 54), 63-67, 70-72, 78, 79, 83-85, 88 are rejected under 35 U.S.C. 102(b) as being anticipated by Murphy et al. (US Patent No. 3,672,950).

Murphy discloses a method of producing an embossed sheet material of two layers of web material joined together by embossing a first layer of web material (web 10), previously provided with a background pattern made up of a first set of protuberances (protuberances 35 formed by embossing rolls 12,13), generating a second set of protuberances on the first layer (web 10 is passed through pattern roll 24 and impression roll 28 which emboss the web by forming pattern lines 33, and further embossed when passed through second pattern roll 30 and impression roll 28) which are partially superimposed on the background pattern and define an ornamental motif

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made of a pattern of major dimensions (the second pattern is of a higher depth, .045in than the first pattern .030in, column 7, lines 5-21) and minor density (see figures) with respect to the background pattern, coupling by means of adhesive the first layer with a second layer of web material (web 9), the adhesive is applied in areas corresponding to at least some protuberances of said second set of protuberances and the sheet material is substantially free of adhesive in correspondence with the first protuberances of the background pattern (the adhesive is only applied according to the pattern of the second set of protuberances on roll 27) (column 5, line 37 to column 6, line 23).

As to claim 51, the background pattern on the first layer of web material is provided by embossing in line and before the embossing of the first layer for generating the ornamental motif (column 5, lines 38-75). As to claim 52, the second layer of web material (web 9) is embossed for generating a third set of protuberances having major dimensions and minor density with respect to the first set of protuberances (the background pattern) (the second layer is embossed between the impression roll 28 and the pattern roll 30, where the pattern roll 30 has a mat 31 which corresponds to the pattern on the mat 27 which as discussed above has major dimensions and minor densities with respect to the background pattern). As to claim 53, the protuberances of the second set (those formed by rolls 24 and 28) and the third set (those formed by rolls 30 and 28) have the same density (the pattern is corresponding, column 6, lines 10-15) and are inserted inside one another (see figure 2, the patterns are impressed onto the "right" side of the webs thus they must be inserted inside one another). As to claim 54, the first set of protuberances (35) on the first layer is generated by running the first layer

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around a first pressure roller interacting with a first embossing cylinder having a first set of points (rolls 12, 13 and pattern of projections engraved on the roll 12) and the second set of protuberances generated by running the first layer around a second embossing cylinder with a second set of points (pattern roll 24 with raised surface) where the second set of points is of larger dimensions and lower density than the first set of points (column 7, lines 5-21). As to claim 56, it can be considered that pattern roll 30 interacting with roll 28 forms the second set of protuberances on the first layer, therefore the second embossing cylinder (30) interacts with a second pressure roller (28) to generate a third set of protuberances (33) on said second layer (9). As to claim 57, the second set of protuberances in the first layer correspond to the third set of protuberances on the second layer and when the adhesive on the second set of protuberances in the first layer contacts the second layer, adhesive is applied to the third set of protuberances on the second layer (column 6, lines 1-23). As to claims 63 and 64, the second layer of web material (9) is provided with a background pattern made of a set of protuberances by embossing in-line and before coupling with the first layer (10) (see figure 2, pattern 35 embossed by rolls 18, 19). As to claims 65 and 78, it is unclear what Applicant intends, however, it appears as though the protuberances of the background pattern and the ornamental motif project on a common face of the corresponding layer. As to claims 66, 83, the protuberances of the ornamental motif have a greater height than the protuberances of the background pattern (the second pattern is of a higher depth, .045in than the first pattern .030in, column 7, lines 5-21) and the first and second layers are joined by adhesive on protuberances of the



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ornamental motif (the adhesive is only applied according to the pattern of the second set of protuberances on roll 27). As to claims 67, 79, 84, 85, the first and second layers are separately embossed by embossing units (rolls 12, 13) and (rolls 18, 19) and then run around an embossing cylinder with points for generating the ornamental motif on the first layer and for joining the first and second layer (rolls 28 and 30). As to claims 70-72, adhesive is applied to the protuberances of the third set on the second layer (the adhesive on the second set of protuberances on the first layer contacts the second layer) and the first and second layers are adhered and joined together with the protuberances in the third set in correspondence with the second set (column 6, lines 1-23). As to claim 88, the second set of protuberances are provided (by rolls 24 and 28) on the first layer (10) before the first layer is joined to the second layer (by rolls 30 and 28) (see figure 2).

***Claim Rejections - 35 USC § 103***

18. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

19. Claims 58, 73-76 are rejected under 35 U.S.C. 103(a) as being unpatentable over Murphy et al. (US Patent No. 3,672,950) in view of Ruppel et al. (US Patent 5,173,351) and/or Barnholtz (WO 97/44528).

Murphy is applied as discussed above in paragraph 17.

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It is considered well known in the art of embossing paper to emboss one layer with a greater embossing depth than the second layer joined to it. For example, Ruppel discloses that it is known to provide differing depths in the embossments of joined embossed webs (column 4, lines 37-45). Barnholtz also discloses it is preferred to have differing embossments (page 5, lines 15-29; page 11, lines 32-35; page 14, lines 11-22) on the joined webs to provide improved properties (page 8, lines 18-26). It would have been obvious to one of ordinary skill in the art at the time of the invention to provide the method of embossing and joining webs as shown in Murphy by embossing the second layer with a greater embossing depth than the embossed depth in the first layer as is well known in the art and exemplified by Ruppel and/or Barnholtz in order to provide improved properties in the resulting composite web.

20. Claims 62, 69, 77, 80-81, 86, 87 are rejected under 35 U.S.C. 103(a) as being unpatentable over Murphy et al. (US Patent No. 3,672,950) in view of Nystrand (US Patent No. 3,867,225).

Murphy is applied as discussed above in paragraph 17.

As to claims 62 and 77, Murphy discloses embossing the first layer (10) with a first embossing cylinder (12) and a first pressure roller (13) for form the first set of protuberances and then forming the second set of protuberances on the first layer (10) by embossing through a nip between an embossing roll 24 and a pressure roll 28 and then passing the first and second layers through a nip between an embossing roll 30 which is identical to the embossing roll 24 and pressure roll 28 to emboss the third set of protuberances on the second layer and joining the two layers. It is known in the

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embossing arts, as exemplified by Nystrand, to emboss two layers (15, 23) with identical embossments and join the two layers by passing the first web (23) through a second embossing cylinder (12) and a second pressure roller (27) and passing the second layer (15) through the nip of the second embossing cylinder (12) and a third pressure roller (11) interacting with the second embossing cylinder (12). It would have been obvious to one of ordinary skill in the art at the time of the invention to provide the method of embossing and joining two webs as shown in Murphy with an embossing roll interacting with two pressure rolls as an alternative to the pressure roll interacting with two embossing rolls since these are functionally equivalent alternatives known in the art as exemplified by Nystrand. Only the expected results would be attained by substituting such configuration.

As to claims 69, 80-81, 86, 87, it is well known in the art of bonding embossed paper webs to use a colored adhesive to join the layers together. Nystrand discloses using a colored adhesive in order to provide a decorative, eye-pleasing pattern (column 2, lines 5-21). It would have been obvious to one of ordinary skill in the art at the time of the invention to provide the method of joining two webs as shown in Murphy by using a colored adhesive in order to provide a decorative pattern as shown by Nystrand.

***Allowable Subject Matter***

21. Claims 55, 56 (based on 55), 59-61, 72 (based on 55), are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

22. Claims 57 (based on 55), 68, 82 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, second paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.

23. The following is a statement of reasons for the indication of allowable subject matter:

As to claim 55, no prior art has been found to show or suggest a method of adhesively joining two webs of material where the first web is embossed with a background pattern and then embossed with an ornamental pattern where the first layer and the second layer are joined between the first pressure roller used to form the background embossing pattern and the second embossing cylinder used to form the ornamental motif.

As to claim 59, no prior art has been found to show or suggest a method of adhesively joining two webs of material where the first web is embossed with a background pattern and then embossed with an ornamental pattern where the second layer is run around the first pressure roller interacting with the first embossing cylinder downstream of where the first layer is embossed and embossing the second layer between the first pressure roller and the second embossing cylinder.

As to claim 68, no prior art was found to show or suggest a method of joining two embossed webs where the first layer is passed through a first embossing unit for embossing the background pattern, then the first layer is embossed on a first embossing cylinder for embossing the ornamental motif and the second layer is embossed between a second embossing cylinder and a pressure roll for embossing the

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background pattern and the first and second layers are joined between the first and second embossing cylinders.

***Response to Arguments***


24. Applicant's arguments with respect to the claims have been considered but are moot in view of the new ground(s) of rejection. All new references are used for the rejections.


***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Gladys J Piazza Corcoran whose telephone number is (703) 305-1271. The examiner can normally be reached on M-F 8am-5:30pm (alternate Fridays off).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Ball can be reached on (703) 308-2058. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9310 for regular communications and (703) 872-9311 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.

  
Gladys JP Corcoran  
November 26, 2002

  
Michael W. Ball  
Supervisory Patent Examiner  
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